



**To:** Mark Gagliardi, City of Oakland  
**From:** Richard Tagore-Erwin  
**Date:** December 19, 2011  
**Subject:** Diversion Goals and Target Dates

---

The purpose of this memo is to discuss the diversion goals, and the options the City of Oakland (City) has for assigning those goals, for inclusion in the Request for Proposals (RFPs) the City is planning to issue regarding the selection of service providers for the collection, processing, and disposal of residential and commercial recyclables, organics, and mixed materials within the City.

### **Background and Methodology**

R3 analyzed 2010 disposal and diversion data, previously gathered for the City, in order to divide that information into the two contracts the City is considering, specifically:

- **Contract A**

- Single Family Dwelling (SFD) Services: source separated organics (SSO), mixed material recovery (MMR), tons to landfill;
- Multi-Family Dwelling (MFD) Services: SSO, MMR;
- Commercial Services: source separated recyclables (SSR), SSO, MMR; and
- City Services: SSR, SSO, MMR.

- **Contract B<sup>1</sup>**

- SFD SSR; and
- MFD SSR.

The City has two options for the tracking of diversion for each contract. The first option is to separate the diversion requirements into specific service sectors (e.g.; SFD SSO, City MMR, etc.). The second option is to require an overall diversion rate for each individual contract that includes all service sectors (i.e.; Total Contract A, Total Contract B).

Please note that a third option is available that is not considered in this memo. That option would be to separate diversion requirements into individual services within service sectors (e.g.; Commercial SSO, Commercial SSR, Commercial MMR, etc.). R3 has chosen not to include this option for the following reasons:

---

<sup>1</sup> Contract B assumes 10% of the source separated recyclables collected is residual, and is sent to the landfill after processing.

- This option would place a heavy administrative burden on the City; and
- This option would provide a disincentive to the contractors in regards to implementing certain programs before they are required by the diversion goal. For example, a diversion goal for SFD MMR is not in place until 2020. If the contractor is required to reach a diversion rate for Total SFD services or Total Contract Services, the contractor may choose to implement the SFD MMR program early to assist in reaching those goals. However, if the goal is specific to MMR, there is no incentive for the contractor to put the program in place prior to the diversion target date.

### **Contract A**

**Option 1** includes the following diversion goals and target dates:

- SFD
  - SSO:
    - ✓ 45% diversion by 2015
    - ✓ 73% diversion by 2020
    - ✓ 73% by 2025
  - MMR
    - ✓ 5% by 2020
    - ✓ 10% by 2025
  - Total SFD Contract A Diversion Rate
    - ✓ 45% by 2015 and/ or 55,000 tons maximum disposal
    - ✓ 78% by 2020 and/or 21,000 tons maximum disposal
    - ✓ 83% by 2025 and/or 16,000 tons maximum disposal
- MFD
  - SSO:
    - ✓ 2% diversion by 2015
    - ✓ 7% diversion by 2020
    - ✓ 7% by 2025
  - MMR
    - ✓ 18% by 2015
    - ✓ 39% by 2020
    - ✓ 58% by 2025
  - Total MFD Contract A Diversion Rate
    - ✓ 20% by 2015 and/or 26,000 tons maximum disposal
    - ✓ 46% by 2020 and/or 17,000 tons maximum disposal
    - ✓ 68% by 2025 and/or 11,000 tons maximum disposal
- Commercial
  - SSR:
    - ✓ 3% diversion by 2015

- ✓ 12% diversion by 2020
  - ✓ 12% by 2025
- SSO:
  - ✓ 6% diversion by 2015
  - ✓ 25% diversion by 2020
  - ✓ 25% by 2025
- MMR
  - ✓ 14% by 2015
  - ✓ 29% by 2020
  - ✓ 45% by 2025
- Total Commercial Diversion Rate
  - ✓ 23% by 2015 and/or 41,000 tons maximum disposal
  - ✓ 66% by 2020 and/or 18,000 tons maximum disposal
  - ✓ 82% by 2025 and/or 10,000 tons maximum disposal
- City
  - SSR:
    - ✓ 2% diversion by 2015
    - ✓ 2% diversion by 2020
    - ✓ 8% by 2025
  - SSO:
    - ✓ 4% diversion by 2015
    - ✓ 16% diversion by 2020
    - ✓ 16% by 2025
  - MMR
    - ✓ 13% by 2020
    - ✓ 26% by 2025
  - Total City Diversion Rate
    - ✓ 6% by 2015 and/or 8,500 tons maximum disposal
    - ✓ 37% by 2020 and/or 5,700 tons maximum disposal
    - ✓ 50% by 2025 and/or 5,000 tons maximum disposal

**Option 2** includes the following diversion goals and target dates:

- Total Contract A Diversion Rate
  - ✓ 33% by 2015 and/or 131,000 tons maximum disposal
  - ✓ 67% by 2020 and/or 61,000 tons maximum disposal
  - ✓ 78% by 2025 and/or 41,000 tons maximum disposal

Table 1 shows the two options discussed above, along with tonnage data.

**TABLE 1**  
**Contract A Options**

			Current Situation		Source Sep Ramp-up Period and MMMRF Start-up		MMMRF for Addl Streams and Source Sep reaches max		MMMRF reaches max	
City of Oakland Diversion Goals and Target Dates										
			2010		Base Term 7/1/2015 - 6/30/2025					
					Initial Diversion Target Date 12/31/2015		Diversion Target Date 12/31/2020		Diversion Target Date 12/31/2025	
Option 1										
SFD										
	Source Separated Organics	37,249	37%	44,836	45%	67,596	73%	67,596	73%	
	Mixed Material Recovery		0%		0%	4,884	5%	9,767	10%	
	Tons to Landfill	64,490	63%	54,751	55%	20,651	22%	15,767	15%	
	Total SFD: Tons/Diversion Rate	101,739	37%	99,587	45%	93,131	78%	93,131	83%	
MFD										
	Source Separated Organics	-	0%	537	2%	2,146	7%	2,146	7%	
	Mixed Material Recovery			5,934	18%	11,869	39%	17,983	58%	
	Tons to Landfill	32,984	100%	25,953	80%	16,728	54%	10,614	35%	
	Total MFD/Diversion Rate	32,984	0%	32,424	20%	30,744	46%	30,744	65%	
Commercial										
	Source Separated Recyclables		0%	1,613	3%	6,453	12%	6,453	12%	
	Source Separated Organics		0%	3,362	6%	13,448	25%	13,448	25%	
	Existing MRF/Future MMMRF	7,402	14%	7,402	14%	15,702	29%	24,002	45%	
	Tons to Landfill	46,371	86%	41,396	77%	18,170	34%	9,870	18%	
	Total Commercial/Diversion Rate	53,773	14%	53,773	23%	53,773	66%	53,773	82%	
City Services										
	Source Separated Recyclables		0%	184	2%	737	8%	737	8%	
	Source Separated Organics		0%	361	4%	1,445	16%	1,445	16%	
	Mixed Material Recovery					1,193	13%	2,385	26%	
	Tons to Landfill	9,061	100%	8,515	94%	5,686	63%	4,494	50%	
	Total City Services/Diversion Rate	9,061	0%	9,061	6%	9,061	37%	9,061	50%	
Option 2										
Total Contract A										
	Total Contract A Source Separated Recyclables	-	0%	1,798	1%	7,190	4%	7,190	4%	
	Total Contract A Source Separated Organics	37,249	19%	49,096	25%	84,636	45%	84,636	45%	
	Total Contract A Mixed Material Recovery	7,402	4%	13,337	7%	33,648	18%	54,138	29%	
	Total Contract A Tons to Landfill	152,906	77%	130,615	67%	61,235	33%	40,745	22%	
Total Contract A Tons/Diversion Rate			197,557	23%	194,845	33%	186,709	67%	186,709	78%

**Option 1** includes the following diversion goals and target dates:

- SFD SSR Diversion Rate
  - ✓ 90% by 2015 and/or 6% increase in SSR tons diverted
  - ✓ 90% by 2020 and/or 16% increase in SSR tons diverted
  - ✓ 90% by 2025
- MFD SSR Diversion Rate
  - ✓ 90% by 2015 and/or 8% increase in SSR tons diverted

- ✓ 90% by 2020 and/or 20% increase in SSR tons diverted
- ✓ 90% by 2025 and/or 0% increase in SSR tons diverted

**Option 2** includes the following diversion goals and target dates:

- Total Contract B Diversion Rate
  - ✓ 90% by 2015 and/or 7% increase in SSR tons diverted
  - ✓ 90% by 2020 and/or 17% increase in SSR tons diverted
  - ✓ 90% by 2025

Table 2 shows the two options discussed above, along with tonnage data.

**TABLE 2**  
**Contract B Options**

		Current Situation		Source Sep Ramp-up Period and MMMRF Start-up		MMMRF for Addl Streams and Source Sep reaches max		MMMRF reaches max	
City of Oakland Diversion Goals and Target Dates									
				Base Term 7/1/2015 - 6/30/2025					
				Initial Diversion Target Date 12/31/2015		Diversion Target Date 12/31/2020		Diversion Target Date 12/31/2025	
		2010							
		TONS	PERCENT	TONS	PERCENT	TONS	PERCENT	TONS	PERCENT
Option 1									
SFD									
	Source Separated Recyclables	28,427	90%	30,363	90%	36,174	90%	36,174	90%
	Tons to Landfill (10% Residual)	3,159	10%	3,374	10%	4,019	10%	4,019	10%
	Total SFD: Tons/Diversion Rate	31,585	90%	33,737	90%	40,193	90%	40,193	90%
MFD									
	Source Separated Recyclables	5718	90%	6,222	90%	7,735	90%	7,735	90%
	Tons to Landfill (10% Residual)	635	10%	691	10%	859	10%	859	10%
	Total MFD: Tons/Diversion Rate	6,354	90%	6,914	90%	8,594	90%	8,594	90%
Option 2									
Total Contract B									
	Total Contract B Source Separated Recyclables	34,145	90%	36,586	90%	43,908	90%	43,908	90%
	Total Contract B Tons to Landfill (10% Residual)	3,794	10.0%	4,065	10%	4,879	10%	4,879	10%
	Total Contract B Tons/Diversion Rate	37,939	90.0%	40,651	90%	48,787	90%	48,787	90%

